

RAW SEQUENCE LISTING ERROR REPORT

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) detected errors when processing the following computer readable form:

Application Serial Number	/0/783,672
Source:	1FW0 8/19/04
Date Processed by STIC:	8/19/04
	,

THE ATTACHED PRINTOUT EXPLAINS DETECTED ERRORS.
PLEASE FORWARD THIS INFORMATION TO THE APPLICANT BY EITHER:

- 1) INCLUDING A COPY OF THIS PRINTOUT IN YOUR NEXT COMMUNICATION TO THE APPLICANT, WITH A NOTICE TO COMPLY or,
- 2) TELEPHONING APPLICANT AND FAXING A COPY OF THIS PRINTOUT, WITH A NOTICE TO COMPLY

FOR CRF SUBMISSION AND PATENTIN SOFTWARE QUESTIONS, PLEASE CONTACT MARK SPENCER, TELEPHONE: 571-272-2510; FAX: 571-273-0221

TO REDUCE ERRORED SEQUENCE LISTINGS, PLEASE USE THE CHECKER

VERSION 4:2 PROGRAM, ACCESSIBLE THROUGH THE U.S. PATENT AND

TRADEMARK OFFICE WEBSITE. SEE BELOW FOR ADDRESS:

http://www.uspto.gov/web/offices/pac/checker/chkrnote.htm

Applicants submitting genetic sequence information electronically on diskette or CD-Rom should be aware that there is a possibility that the disk/CD-Rom may have been affected by treatment given to all incoming mail. Please consider using alternate methods of submission for the disk/CD-Rom or replacement disk/CD-Rom. Any replý including a sequence listing in electronic form should NOT be sent to the 20231 zip code address for the United States Patent and Trademark Office, and instead should be sent via the following to the indicated addresses:

- 1. EFS-Bio (<http://www.uspto.gov/ebc/efs/downloads/documents.htm>, EFS Submission User Manual ePAVE)
- 2. U.S. Postal Service: Commissioner for Patents, P.O. Box-1450, Alexandria, VA 22313-1450
- 3. Hand Carry, Federal Express, United Parcel Service, or other delivery service (EFFECTIVE 06/05/04):
 U.S. Patent and Trademark Office, 220 20th Street S., Customer Window, Mail Stop Sequence, Crystal Plaza Two, Lobby, Room 1B03, Arlington, VA 22202

Revised 05/17/04

Raw Sequence Listing Error Summary

ATTN: NEW RULES CASES: PLEASE DISREGARD ENGLISH "ALPHA" HEADERS, WHICH WERE INSERTED BY PTO SOFTWAR I Wapped Aminos Prevent "wrapped" and word processor after creating it. Please adjust your right margin to 3; this will prevent "wrapping." 2 Invalid Line Longth The nules require that a line not exceed 72 characters in length. This includes white spaces. Misaligned: Aminos The numbering under each 5" amino acid, is misaligned. Do not use tab codes between.numbers; we space characters, instead. 4 Non-ASCII The submitted file was not saved in ASCII(DOS) text, as required by the Sequence Rules. Please ensure your subsequent submission is saved in ASCII text. 5 Variable Length Sequences ("Contain n's or Xaa's representing more than one residue. Per Sequence Rules, each nor Xaa can only represent a single residue. Please present the marinum number of each residue having variable length and indicate in the \$200\$-\$222\$- section to be missing from when the subsequent submission is saved in ASCII text. 5 Variable Length Aminos The submitted file was not saved in ASCII(DOS) text, as required by the Sequence Rules. Please ensure your subsequent submission is saved in ASCII text. 5 Variable Length Aminos The submitted file was not saved in ASCII ("Contain n's or Xaa's representing more than one residue. Per Sequence Rules, each nor Xaa can only represent a single residue. Please present the marinum number of each residue having variable length and indicate in the \$200\$-\$222\$- section to be missing from amino acid sequence. 7 Skipped Sequences ("CILD RULES) ("Dis Normally, Please anaually copy the relevant \$220\$-\$222\$- section to the subsequent amino acid sequence. This applies to the mandatory \$220\$-\$223\$- section to Artifleial or Unknown sequences. 8 Skipped Sequences ("Supper Caller RacTERISTICS" (Do not insert any subheadings under this heading). ("S) SEQUENCE DESCRIPTION SEQ ID NOX" (insert SEQ ID NO where "X" is shown) This sequence is intentionally skipped Please also adjust the "(ii) NUMBER OF SEQUENCES." r			
Wrapped Nucleics Wrapped Amino Wrapped Amino Wrapped Wrapped Amino Wrapped Amino Wrapped W		ERROR DETECTED	SUGGESTED CORRECTION SERIAL NUMBER: 10/183672
wrapped Arminos prevent "wrapping." 2Invalid Line Length The rules require that a line not exceed 72 characters in length. This includes white spaces. Misaligned Armino: The numbering under each 5th amino.acid is misaligned. Do.not use tab codes between numbers; use space characters, instead. 4Non-ASCII		ATTN: NEW RULES CASES	S: PLEASE DISREGARD ENGLISH "ALPHA" HEADERS, WHICH WERE INSERTED BY PTO SOFTWARE
Misaligned-Amino Numbering Wisaligned-Amino Wisaligned-Ascillance Wisaligned-Amino		1Wrapped Nucleics Wrapped Aminos	was retrieved in a word processor after creating it. Please adjust your right margin to .3; this will
Numbering Use space characters, instead.		2Invalid Line Length	The rules require that a line not exceed 72 characters in length. This includes white spaces.
ensure your subsequent submission is saved in ASCII text. Sequence(s)	· · · · · · · · · · · · · · · · · · ·	Misaligned Amino Numbering	The numbering under each 5th amino acid is misaligned. Do not use tab codes between numbers use space characters, instead.
each n or Xaa can only represent a single residue. Please present the maximum number of each residue having variable length and indicate in the <220>-223> section that some may be missing. A "bug" in PatentIn version 2.0 has caused the <220>-223> section to be missing from amino acid sequences(s)		4Non-ASCII	The submitted file was not saved in ASCII(DOS) text, as required by the Sequence Rules. Please ensure your subsequent submission is saved in ASCII text.
"bug" sequences(s)		5 Variable Length	each n or Xaa can only represent a single residue. Please present the maximum number of each
(OLD RULES) (2) INFORMATION FOR SEQ ID NO:X: (insert SEQ ID NO where "X" is shown) (3) SEQUENCE CHARACTERISTICS: (Do not insert any subheadings under this heading). (xi) SEQUENCE DESCRIPTION:SEQ ID NO:X: (insert SEQ ID NO where "X" is shown) This sequence is intentionally skipped Please also adjust the "(ii) NUMBER OF SEQUENCES:" response to include the skipped sequences. Sequence(s)			sequences(s) Normally, Patentln would automatically generate this section from the previously coded nucleic acid sequence. Please manually copy the relevant <220>-<223> section to the subsequent amino acid sequence. This applies to the mandatory <220>-<223> sections for
Skipped Sequences (NEW RULES) Sequence id number 210> sequence Rules, use of 220>-223> is MANDATORY if n's or Xaa's are present. In 220> to 223> section, please explain location of n or Xaa, and which residue n or Xaa represents. Sequence Rules, the only valid 213> responses are: Unknown, Artificial Sequence, or scientific name (Genus/species). 220>-223> section is required when 213> response is Unknown or is Artificial Sequence Sequence(s)	2. 20d (A) 中国 于真花形	(OLD RULES)	(2) INFORMATION FOR SEQ ID NO:X: (insert SEQ ID NO where "X" is shown) (i) SEQUENCE CHARACTERISTICS: (Do not insert any subheadings under this heading) (xi) SEQUENCE DESCRIPTION:SEQ ID NO:X: (insert SEQ ID NO where "X" is shown)
(NEW RULES) 210> sequence id number 400> seqüence id number (NEW RULES) Use of n's or Xaa's (NEW RULES) Use of n's and/or Xaa's have been detected in the Sequence Listing. Per 1.823 of Sequence Rules, use of <220> <223> is MANDATORY if n's or Xaa's are present. In <220> to <223> section, please explain location of n or Xaa, and which residue n or Xaa represents. Per 1.823 of Sequence Rules, the only valid <213> responses are: Unknown, Artificial Sequence, or scientific name (Genus/species). <220> <220> <223> section is required when <213> response is Unknown or is Artificial Sequence Use of <220> Sequence(s) missing the <220> "Feature" and associated numeric identifiers and responses. Use of <220> to <223> is MANDATORY if <213> "Organism" response is "Artificial Sequence" or "Unknown." Please explain source of genetic material in <220> to <223> section. (See "Federal Register," 06/01/1998, Vol. 63, No. 104, pp. 29631-32) (Sec. 1.823 of Sequence Rules) Please do not use "Copy to Disk" function of Patentln version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence		,	Please also adjust the "(ii) NUMBER OF SEQUENCES:" response to include the skipped sequences.
Per 1.823 of Sequence Rules, use of <220>-<223> is MANDATORY if n's or Xaa's are present. In <220> to <223> section, please explain location of n or Xaa, and which residue n or Xaa represents. Per 1.823 of Sequence Rules, the only valid <213> responses are: Unknown, Artificial Sequence, or scientific name (Genus/species). <220>-<223> section is required when <213> response is Unknown or is Artificial Sequence Use of <220> Sequence(s) missing the <220> "Feature" and associated numeric identifiers and responses. Use of <220> to <223> is MANDATORY if <213> "Organism" response is "Artificial Sequence" or "Unknown." Please explain source of genetic material in <220> to <223> section. (See "Federal Register," 06/01/1998, Vol. 63, No. 104, pp. 29631-32) (Sec. 1.823 of Sequence Rules) Please do not use "Copy to Disk" function of PatentIn version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence			<210> sequence id number <400> sequence id number
Response scientific name (Genus/species). <220>-<223> section is required when <213> response is Unknown or is Artificial Sequence Sequence(s) missing the <220> "Feature" and associated numeric identifiers and responses. Use of <220> to <223> is MANDATORY if <213> "Organism" response is "Artificial Sequence" or "Unknown." Please explain source of genetic material in <220> to <223> section. (See "Federal Register," 06/01/1998, Vol. 63, No. 104, pp. 29631-32) (Sec. 1.823 of Sequence Rules) Please do not use "Copy to Disk" function of PatentIn version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence		9Use of n's or Xaa's (NEW RULES)	Per 1.823 of Sequence Rules, use of <220>-<223> is MANDATORY if n's or Xaa's are present.
Use of <220> to <223> is MANDATORY if <213> "Organism" response is "Artificial Sequence" or "Unknown." Please explain source of genetic material in <220> to <223> section. (See "Federal Register," 06/01/1998, Vol. 63, No. 104, pp. 29631-32) (Sec. 1.823 of Sequence Rules) Patentln 2.0 "bug" Please do not use "Copy to Disk" function of Patentln version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence			scientific name (Genus/species). <220>-<223> section is required when <213> response is Unknown or
"bug" resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence	* 2	11Use of <220>	Use of <220> to <223> is MANDATORY if <213> "Organism" response is "Artificial Sequence" or "Unknown." Please explain source of genetic material in <220> to <223> section.
isting). Instead, please use "File Manager" or any other manual means to copy file to floppy disk.			Please do not use "Copy to Disk" function of PatentIn version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence listing). Instead, please use "File Manager" or any other manual means to copy file to floppy disk.
Misuse of n/Xaa "n" can only represent a single <u>nucleotide</u> ; "Xaa" can only represent a single <u>amino acid</u>	1	13 Misuse of n/Xaa	"n" can only represent a single nucleotide; "Xaa" can only represent a single amino acid

AMC - Biotechnology Systems Branch - 09/09/2003



IFWO

RAW SEQUENCE LISTINGPATENT APPLICATION: **US/10/783,672**DATE: 08/19/2004

TIME: 15:14:43

Input Set : D:\53279-20003.00 - Seqlist.txt
Output Set: N:\CRF4\08192004\J783672.raw

```
4 <110> APPLICANT: EMERSON, Beverly M.
              KADAM, Shilpa B.
      7 <120> TITLE OF INVENTION: METHODS OF MODULATING GENE EXPRESSION
     10 <130> FILE REFERENCE: 532792000300
     12 <140> CURRENT APPLICATION NUMBER: US 10/783,672
     13 <141> CURRENT FILING DATE: 2004-02-20
     15 <150> PRIOR APPLICATION NUMBER: US 60/450,771
     16 <151> PRIOR FILING DATE: 2003-02-26
     18 <160> NUMBER OF SEQ ID NOS: 3
     20 <170> SOFTWARE: FastSEQ for Windows Version 4.0
     22 <210> SEQ ID NO: 1
     23 <211> LENGTH: 20
     24 <212> TYPE: PRT
     25 <213> ORGANISM: Homo sapiens
     27 <220> FEATURE:
     28 <221> NAME/KEY: ZN FING
     29 <222> LOCATION: 1,9
     30 <223> OTHER INFORMATION: Xaa = tyrosine or phenylalanine
     32 <221> NAME/KEY: ZN FING
                                                                     Xaa can only represent a

ent 2-4 times sergle
anima acid

ent 3-4 times (sel
gent Son

Even

furmany fleet)
     33 <222> LOCATION: 2, 6-8, 10-14, 16-17-
     34 <223> OTHER INFORMATION: Xaa = any amino acid
  -> 36 <221> ZN FING
     37 <222> LOCATION: 4
     38 <223> OTHER INFORMATION Xaa = any amino acid may be present 2-4 times
W--> 40 <221> ZN FING
     41 <222> LOCATION: 19
     42 <223> OTHER INFORMATION: (Xaa = any amino acid may be present 3-4 times
W-->44<400>1
W--> 45 Xaa Xaa Cys Xaa Cys Xaa Xaa Xaa Xaa Xaa Xaa Xaa Xaa Xaa Leu Xaa
     47 Xaa His Xaa His
     48
                     20
     51 <210> SEQ ID NO: 2
     52 <211> LENGTH: 42
     53 <212> TYPE: PRT
     54 <213> ORGANISM: Homo sapiens
     56 <220> FEATURE:
     57 <221> NAME/KEY: ZN FING
     58 <222 LOCATION: 2-3, 5-17, 19-20, 24-28, 30-38, 40-41
     59 <223> OTHER INFORMATION: Xaa = any amino acid
     61 <221> NAME/KEY: ZN FING
     62 <222> LOCATION: 22
     63 <223> OTHER INFORMATION( Xaa = any amino acid may be present 14-15 times
```

RAW SEQUENCE LISTING

DATE: 08/19/2004

PATENT APPLICATION: US/10/783,672

TIME: 15:14:43

Input Set : D:\53279-20003.00 - Seqlist.txt
Output Set: N:\CRF4\08192004\J783672.raw

- 81 <222> LOCATION: 3-6, 13-14, 21, 29, 31
- 82 <223> OTHER INFORMATION: Xaa = any amino acid
- 84 <400> SEQUENCE: 3
- -> 85 Lys Arg Xaa Xaa Xaa Xaa Arg Lys Ser Ala Gln Asn Xaa Xaa Ser Ala
 - 6 1 5 1
 - 87 Gln Ser Ala Gln Xaa Arg Lys Thr Ala Glu Asn Gln Xaa Arg Xaa Arg
 - 88 20 25 30
 - 89 Lys

RAW SEQUENCE LISTING ERROR SUMMARY

DATE: 08/19/2004

PATENT APPLICATION: US/10/783,672

TIME: 15:14:44

Input Set : D:\53279-20003.00 - Seqlist.txt Output Set: N:\CRF4\08192004\J783672.raw

Please Note:

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:1; Xaa Pos. 1,2,4,6,7,8,8,10,11,12,13,14,16,17,19

Seq#:2; Xaa Pos. 2,3,5,6,7,8,9,10,11,12,13,14,15,16,17,19,20,22,24,25,26,27

Seq#:2; Xaa Pos. 28,30,31,32,33,34,35,36,37,38,40,41 Seq#:3; Xaa Pos. 3,4,5,6,13,14,21,29,31

VERIFICATION SUMMARY

DATE: 08/19/2004 TIME: 15:14:44

Input Set : D:\53279-20003.00 - Seqlist.txt
Output Set: N:\CRF4\08192004\J783672.raw

PATENT APPLICATION: US/10/783,672

L:36 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:1 L:40 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:1 L:44 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:1 L:45 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 after pos.:0 M:341 Repeated in SeqNo=1

L:65 M:258 W: Mandatory Feature missing, <220> Tag not found for SEQ ID#:2

L:66 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:2 after pos.:0

M:341 Repeated in SeqNo=2

L:85 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:3 after pos.:0

M:341 Repeated in SeqNo=3